

REMARKS

Applicants appreciate the thorough examination of the present application as evidenced by the Final Office Action mailed January 9, 2008 (hereinafter "Final Action" and the "Notice of Panel Decision from Pre-Appeal Brief Review" mailed August 14, 2008). In response, Applicants have amended independent Claims 1, 8, and 15 to clarify that a common MPLS label that identifies an LSP is used to encapsulate traffic that is associated with different layer two technologies. Accordingly, the traffic that is associated with different layer two technologies is routed using the same LSP, which is not disclosed or suggested in the cited reference. Accordingly, Applicants submit that all pending claims are in condition for allowance. Favorable reconsideration of all pending claims is respectfully requested for at least the reasons discussed hereafter.

Independent Claims 1, 8, and 15 are Patentable

Independent Claims 1 and 8 stand rejected under 35 U.S.C. §102(e) as being anticipated by U. S. Patent Publication No. 2004/0190548 to Harel et al. (hereinafter "Harel"). (Final Action, page 2). Independent Claim 15 stands rejected under 35 U.S.C. §103(a) as being unpatentable over Harel. (Final Action, page 4). Independent Claim 1 is directed to a method of operating a multiprotocol label switching (MPLS) network, and recites, as amended:

establishing a label switched path (LSP) that connects a first provider edge (PE) label switched router (LSR) a second PE LSR, and a customer edge (CE) LSR;

encapsulating packet traffic that is associated with a plurality of different layer two technologies with a common MPLS label that identifies the LSP; and

securely routing the encapsulated packet traffic from the first PE LSR through the second PE LSR to the CE LSR using the LSP.
(Emphasis added).

Independent Claims 8 and 15 include similar recitations. According to the recitations of Claim 1, an LSP is established and packet traffic that is associated with a plurality of different layer two technologies is encapsulated with a common MPLS label. The encapsulated packet traffic associated with the multiple layer two technologies is routed using the same LSP. Thus, embodiments of the present invention may aggregate traffic associated with multiple layer two technologies onto a single LSP.

In sharp contrast, Harel describes accepting input data from a packet source 32 and a time division multiplexed (TDM) source 30. An integrated transport device (ITD) encapsulates the data from both the packet source 32 and the TDM source 30 into packets for transmission over a network 28. (Harel, paragraphs 84 and 87 - 93; FIGS. 1 and 2). In sharp contrast to the recitations of independent Claim 1, however, Harel does not disclose or suggest aggregating the packets associated with the packet source 32 and the packets associated with the TDM source 30 onto the same LSP. Applicants acknowledge that Harel suggests that MPLS may be used to carry packets through the network 28, but Harel states that the packets are transmitted using MPLS tunnels. (Harel, paragraph 84). That is, Harel envisions multiple MPLS tunnels, i.e., multiple LSPs being used to carry the packets associated with the packet source 32 and the TDM source 30. Applicants cannot find any disclosure or suggestion in Harel that a single LSP be used to carry packet traffic associated with the packet source 32 and packet traffic associated with the TDM source 30.

In response to this analysis the Final Action cites paragraph 34 from the "Summary of the Invention" section of Harel as teaching the use of MPLS tunnels for carrying packets through the network 28. (Final Action, page 5). The Final Action further alleges that the purpose of MPLS is to ensure that all packets in a particular flow take the same route over a network backbone. (Final Action, page 5). Applicants submit that the Final Action still fails to provide any support for the assertion that Harel teaches using a single LSP to carry packet traffic associated with different layer two technologies. In fact, Applicants submit that Harel teaches against using the same LSP to carry packet traffic associated with different layer two technologies. In paragraph 84, Harel states that the MPLS transport through the network may be performed using the scheme described in Martini et al. as described

in the "Background of the Invention" section. The Martini et al. scheme is described in paragraph 17 of Harel and involves the use of a "pseudo wire" (PW) label to identify the particular layer two service to be used for processing a packet. Importantly, paragraph 17 states: "...The PW type specifies **the type of layer 2 service to be carried between the tunnel endpoints**,...The PW ID is used by the layer 2 service endpoints to **associate the locally-configured service with the tunnel**." Thus, the Martini scheme, which is used in Harel's system, associates a particular layer two service with a particular tunnel through a pseudo wire label. This means that Harel limits a LSP to carrying traffic associated with a single layer two technology, not multiple layer two technologies as recited in the pending independent claims.

For at least the foregoing reasons, Applicants respectfully submit that independent Claims 1, 8, and 15 are patentable over Harel and that Claims 2 - 7, 9 - 14, and 16 - 21 are patentable at least per the patentability of independent Claims 1, 8, and 15.

Various Dependent Claims are Separately Patentable

Dependent Claims 4 and 11 stand rejected under 35 U.S.C. §102(e) as being anticipated by Harel. (Final Action, page 3). Dependent Claim 18 stands rejected under 35 U.S.C. §103(a) as being unpatentable over Harel. (Final Action, page 4). Applicants submit that dependent Claims 4, 11, and 18 are patentable at least per the patentability of independent Claims 1, 8, and 15, respectively. Applicants further submit that dependent Claims 4, 11, and 18 are separately patentable because Harel does not disclose or suggest statically provisioning an MPLS label between a PE LSR and a CE LSR and stitching the statically provisioned MPLS label to a signaled LSP that connects first and second PE LSRs. The Final Action cites paragraph 17 of Harel as disclosing the recitations of Claims 4, 11, and 18 (Final Action, page 3), but this paragraph describes the use of a pseudo wire (PW) label and does not provide any disclosure with respect to stitching a statically provisioned MPLS label to a signaled LSP. Applicants submit, therefore, that dependent Claims 4, 11, and 18 are separately patentable over Harel for at least these additional reasons.

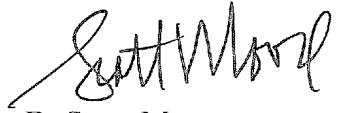
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CONCLUSION

In light of the above amendments and remarks, Applicants respectfully submit that the above-entitled application is now in condition for allowance. Favorable reconsideration of this application, as amended, is respectfully requested. If, in the opinion of the Examiner, a telephonic conference would expedite the examination of this matter, the Examiner is invited to call the undersigned attorney at (919) 854-1400.

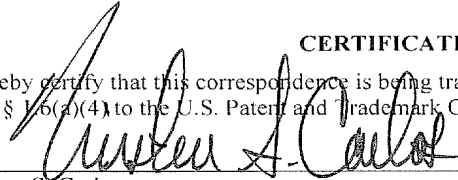
Respectfully submitted,

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CERTIFICATION OF TRANSMISSION

I hereby certify that this correspondence is being transmitted via the Office electronic filing system in accordance with § 1.6(a)(4) to the U.S. Patent and Trademark Office on October 14, 2008.


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